TECHNOLOGY COORDINATION OFFICE Review and Opinion Regarding the Proposed <u>HP-NonStop Virtual Tape Solution</u> Dec 7, 2009

SPONSOR:

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COST SUMMARY:

CIP

HP NonStop Virtual Tape System

\$279,121.04**

FY 2010 Budget Impact

Budgeted?

Yes

**NOTE: The total cost includes all hardware, software, training, installation and one year of maintenance (\$195,423.62) plus four additional years of maintenance (\$83,697.42).

VENDOR: Venture Technologies, Inc.

OVERVIEW:

Central Information Technology (CIT) proposes to implement a Virtual Tape Solution sometimes referred to as a 'Disk to Disk Unattended Backup Solution' for the HP-NonStop computer environments at the primary and backup data centers. This solution will be used to backup and archive data from some of the most mission critical applications processed for the Shelby County Government (i.e. Jail Management System, Justice Support System, Business Tax and Child Support).

OPINION: RECOMMENDED

Stated Business Need

In an effort to increase efficiencies, reduce costs and improve operational and support-related services to the County, Central Information Technology has reviewed the expenses, inefficiencies and risks involved with the dated disk to tape backup solution that has been in place for several years. With the increasing amount of data being processed by the applications on the HP NonStop systems, the time required to backup and archive this data has increased exponentially. In addition to this increase in processing time, the number of physical tapes for storage has increased which also dictates the need for more computer operator manual intervention. There are also expenses related to tape system maintenance, physical tape storage and transportation that have also risen over the years. With the requirements of 24 x 7 operations and the need for near-instantaneous recovery of critical data, the existing backup systems are no longer adequate to meet the growing needs of Shelby County Government.

The intent of this request is to upgrade to a newer system that will take advantage of technological advances in data compression and faster transport speeds of disk to disk operations while keeping expenditures within the norm for infrastructures of this size and complexity. This positions CIT with the required equipment in the life cycle that would negate the need for subsequent replacement for the foreseeable future. This request also provides the CIT staff with the capabilities to better provide for business continuity and disaster preparedness.

Value for the Financial Outlay

Two responses to the RFP were received and Venture Technologies submitted the best bid while meeting the specifications of the RFP. Central IT compared three-year and five-year maintenance agreements and opted for the five-year maintenance term to lock-in reduced maintenance rates.

This solution has the potential to free up at least 2 FTE (tape librarians) as the tape requirement is gradually phased out. These FTE could be re-allocated to other duties or possibly eliminated.

Central IT submits that only the storage array in the proposed solution is interoperable with other County computing platforms in the event that the HP NonStop systems are retired within the next five to seven years. The efficiency gains, operations cost reduction and risk mitigation go a long way in justifying the use of this solution.

Due Diligence

Central IT conducted a Proof of Concept prior to submitting the RFP to determine if the proposed solution performance metrics met their expectations. Backup of County data utilizing the normal disk to tape operation which normally took 18 hours was performed. The test of the disk to disk solution of the same data took 3 hours (an 83% reduction in time) without operator intervention. TCO participated in meetings and discussions with Central IT to ensure the soundness and thoroughness of this request.

Strategic Fit

The proposed solution meets TCO recommendations for operational optimization through the use of technology. Utilization of this solution also mitigates the risk of data loss (or unavailability) as a result of tape media failure or backup incompletion in the current environment.

Information Security Considerations

The Central IT group is responsible for ensuring the adequacy of security provisions on the County's network. The solution proposed in this project will not significantly alter the risks to confidentiality and integrity faced by the County since the data will be transported over the County's private network. Nonetheless, care and testing will be needed during the implementation to ensure that the changes do not have unintended negative impacts as a result of misconfiguration or mis-communication with vendors.

Lee Miller

For the Technology Coordination Office